State of Wisconsin
Governor Scott Walker

Department of Agriculture, Trade and Consumer Protection
Ben Brancel, Secretary

CAPS ANNUAL ACCOMPLISHMENT REPORT 2013

State	Wisconsin
Year	2013 Annual
Agency	Wisconsin Department of Agriculture, Trade and Consumer Protection

I. Core level funding activities

A. State Survey Coordinator

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B. Member name of National CAPS Committee:

C. Compare actual accomplishments to objectives established for the period

Continued infrastructure development and support were key elements in the 2013 WI CAPS request, and greatly augmented the abilities of the State to assist with the goals of protecting our food supply and agricultural system. Funding for the laboratory Plant Pathologist position and supplies at the DATCP Plant Industry Bureau Laboratory were critical components of the Core Work Plan.

D. If appropriate, explain why objectives were not met.*

All objectives were met.

E. Where appropriate, explain any cost overruns.*

None.

F. State CAPS Committee narrative-meeting dates, attendees, agenda.

The Wisconsin State CAPS Committee met on May 13, 2013. The agenda and minutes are attached (Appendix A).

G. NAPIS database submissions

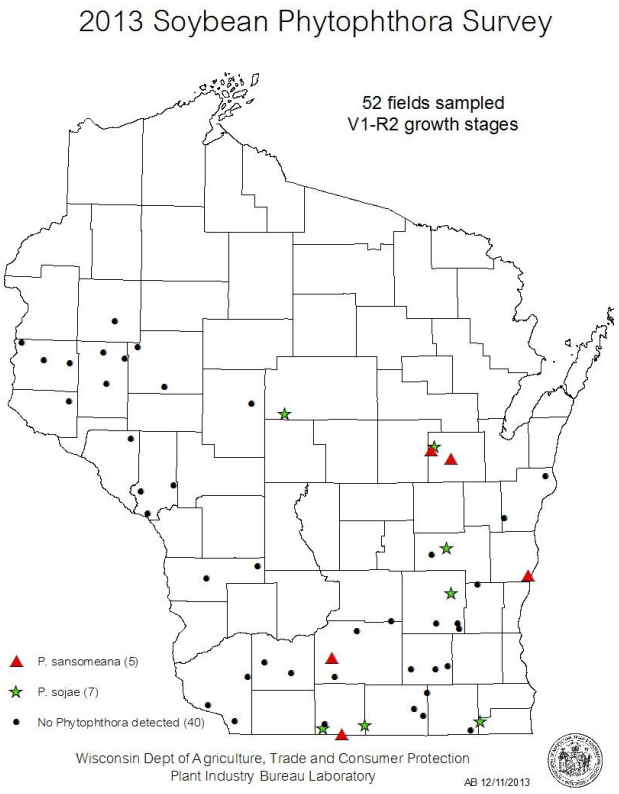
Survey data were entered into NAPIS by the required dates.

II. SOYBEAN COMMODITY SURVEY

A. Survey methodology

Within the context of a commodity survey, a pool of randomly-selected fields was sampled for multiple pests. An early-season survey for Phytophthora seedling root rots sampled a subset of the larger pool of target fields tested for virus and observed for rust. A concern driving the root rot survey was the 2012 Wisconsin detection of *Phytophthora sansomeana*, a recently-described species with a wide host range that includes corn and alfalfa, crops often grown in rotation with soybeans. Fifty soybean fields and two fields in which *P. sansomeana* was detected in 2012 on soybeans, planted to corn in 2013, were sampled.

Following the seedling sampling, a broad detection survey was conducted for soybean rust and several other soybean pests including various soybean viruses (soybean dwarf virus (SbDV), soybean vein necrosis associated virus (SVNaV), alfalfa mosaic virus (AMV)), frogeye leaf spot (*Cercospora sojina*), white mold (*Sclerotinia sclerotiorum*), soybean aphid (*Aphis glycines*), bean leaf beetle (*Ceratoma trifurcata),* Japanese beetle (*Popillia japonica*), soybean pod borer (*Maruca vitrata*), and other diseases and pests which may be encountered in soybeans. In a large subset of sample sites, fields were sampled twice during the R4 to R6 stages of growth to assess seasonal soybean aphid densities while potential treatment, if required, would still be beneficial.

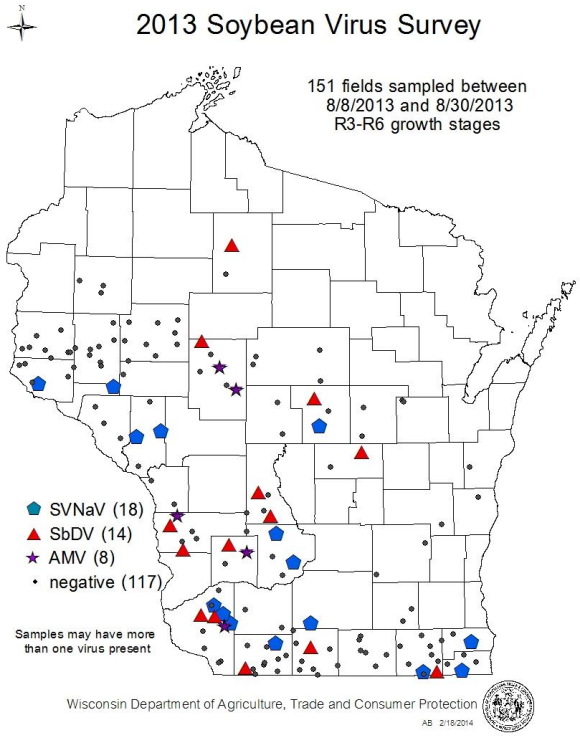


Fields for disease sampling were chosen using Visual Sample Plan statistical software (as outlined in the Soybean Commodity Guide) and Arc Map. Sample numbers were based on relative soybean acreage by county, with a desired actual sample size of 150 fields visited.

In each field, plant pathologists stopped at four sites and took two leaflets from five plants in the R4 to R6 life stage. The leaves were kept on ice until delivered to Plant Industry Laboratory for testing. Foliage was tested using a molecular method, reverse transcription (RT) - polymerase chain reaction (PCR).

Fields for aphid testing were chosen based upon historical survey sites, again distributed by relative soybean acreage per county. In each selected field, in addition to observations for the target pests listed above, five plants at each of four locations were pulled, and the number of soybean aphids counted.

B. Rationale underlying survey methodology



Sampling fields at the R2-R4 stages of growth facilitates accurate comparison of aphid survey results from year to year and indicates peak aphid levels during a given season. In addition, surveying for a broader range of soybean pests at each site (rust, viruses, soybean aphids, bean leaf beetle) increases the efficiency of the survey and allows for the collection of more field data. For the virus/rust survey, a later stage of maturity was selected to increase the probability of detectable virus titer. For the virus survey, the target number of fields allows for 90% confidence of detection with a 1% detection threshold.

C. Survey dates

Sampling for Phytophthora was conducted between June 7 and July 18, 2013. The field portion of the main survey was carried out from August 8 to August 30, 2013. Disease diagnostic work was performed by Plant Industry Laboratory personnel from August 8 to December 12, 2013.

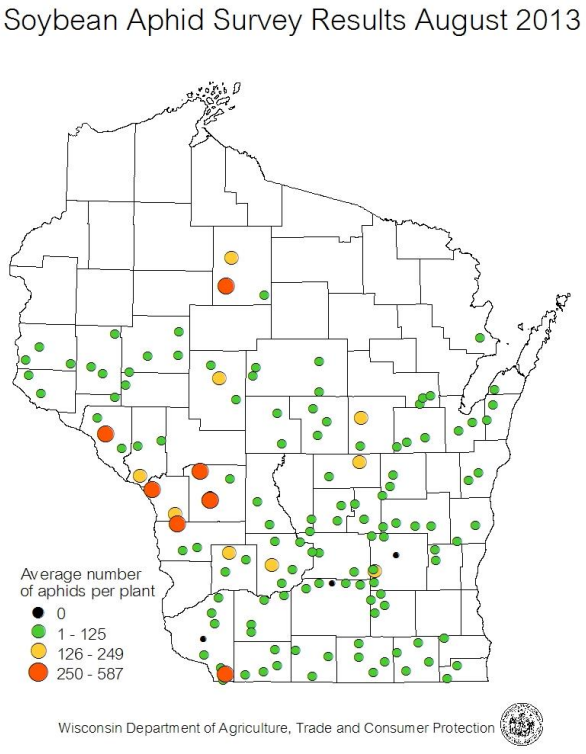
D. Taxonomic services

DATCP Entomologist, Krista Hamilton (primary insect screening).
DATCP Plant Industry Lab, Anette Phibbs (primary disease screening).
Confirmation by USDA identifiers as appropriate.

E. Results of survey

Early-season samples were diagnosed at Plant Industry Laboratory for Phytophthora root rot using polymerase chain reaction (PCR). *Phytophthora sojae* was detected in seven samples, and *P. sansomeana* was detected in five.

For the main disease component of the survey, leaf samples were collected in 151 fields. Alfalfa mosaic virus was detected in samples from eight fields; soybean dwarf virus was detected in 14 samples. The emerging virus soybean vein necrosis-associated virus was



detected in 18 samples but did not always express symptoms in the field.
Examination of 139 soybean fields (each visited twice) between July 23 and Aug ust 24, 2012 found 6% of fields where the soybean aphid population was above the established economic threshold of 200 aphids per plant, and the highest levels of aphids in five years (55 aphids per plant average). This insect was the most economically important insect affecting soybeans in Wisconsin in 2013. No soybean pod borer or other exotic insect pest was detected during the survey.

No Asian soybean rust or yellow witchweed was detected in any of the 479 Wisconsin soybean field visits made under the CAPS commodity survey in 2013.

F. Compare actual accomplishments to objectives established for the period.
The survey plan proposed a total of 250 sites. Combining the early season disease survey, the main disease survey and the insect survey, a total of 479 fields were surveyed.

G. If appropriate, explain why objectives were not met*
Objectives were exceeded.

H. Where appropriate, explain any cost overruns*
None.

SIGNATURES

_____ date **3/14/14**
Adrian Barta, SSC
WI DATCP

Appendix A: State CAPS Committee Agenda

2013 WI CAPS State Committee

Monday, 5/13/2013
8:00 am
The Egg and I
2501 W. Beltline
(S. Frontage E of Todd)

Meeting called by: Program **Type of meeting:** Annual

Attendees: SPHD JoAnn Cruse, SPRO Brian Kuhn, PSS Art Wagner, SSC Adrian Barta

Please bring: 2014 Guidelines if you like, thoughts on the pest list uses, hunger for breakfast

----- Agenda Topics -----

2014 CAPS Guidelines	Adrian
Pest List	Brian
“Bundling" and commodities	Adrian
Outreach ideas/purpose	All
2013 Work plan and budget revisions—timeframe	All
Follow-up for citrus greening and other reports--process	All

---- Additional Information ----

Any additional relevant topics are welcome.

If problems arise over attendance prior to the meeting, please call Adrian at 516-0506 or 832-4844.

2013 Wisconsin State CAPS Committee Meeting Minutes

May 13, 2013
Attendees: JoAnn Cruse, Art Wagner, Brian Kuhn, Adrian Barta
Agenda: attached
Clarification on 2013 funding cuts. Cuts may be apportioned 50% to infrastructure, 50% to surveys. (Various proportions had been circulating.) This is the figure for which DATCP will make adjustments.
2014 Guidelines
The CAPS Program Guidelines for 2014 were released last week. On first reading, significant changes from 2013 include:

- Funding for 2014 will be at the reduced 2013 level ($101,420 rather than the historical $110,000).
- The "Additional Pest of Concern" list will no longer exist.
- Additional reporting will be required—infrastructure and surveys will be reported separately.

2014 timeline for work plans and budgets

- August 16, 2013-- to Field Ops
- August 1—to local PPQ for final review
- July 21 – draft circulating at DATCP with copy to Art for preliminary comments

Pest List—practice and purpose

- WI has not formally composed a pest list for three years or more
- Purpose once was to identify state-specific risks and populate the pest universe from which AHP drew pests for analysis; state lists no longer feed into the national program in any meaningful way.
- State lists are no longer required.
- Have we lost a risk assessment factor by no longer compiling a list? Art and Adrian will discuss possible frameworks for identification of pests which may pose a specific risk to the state.

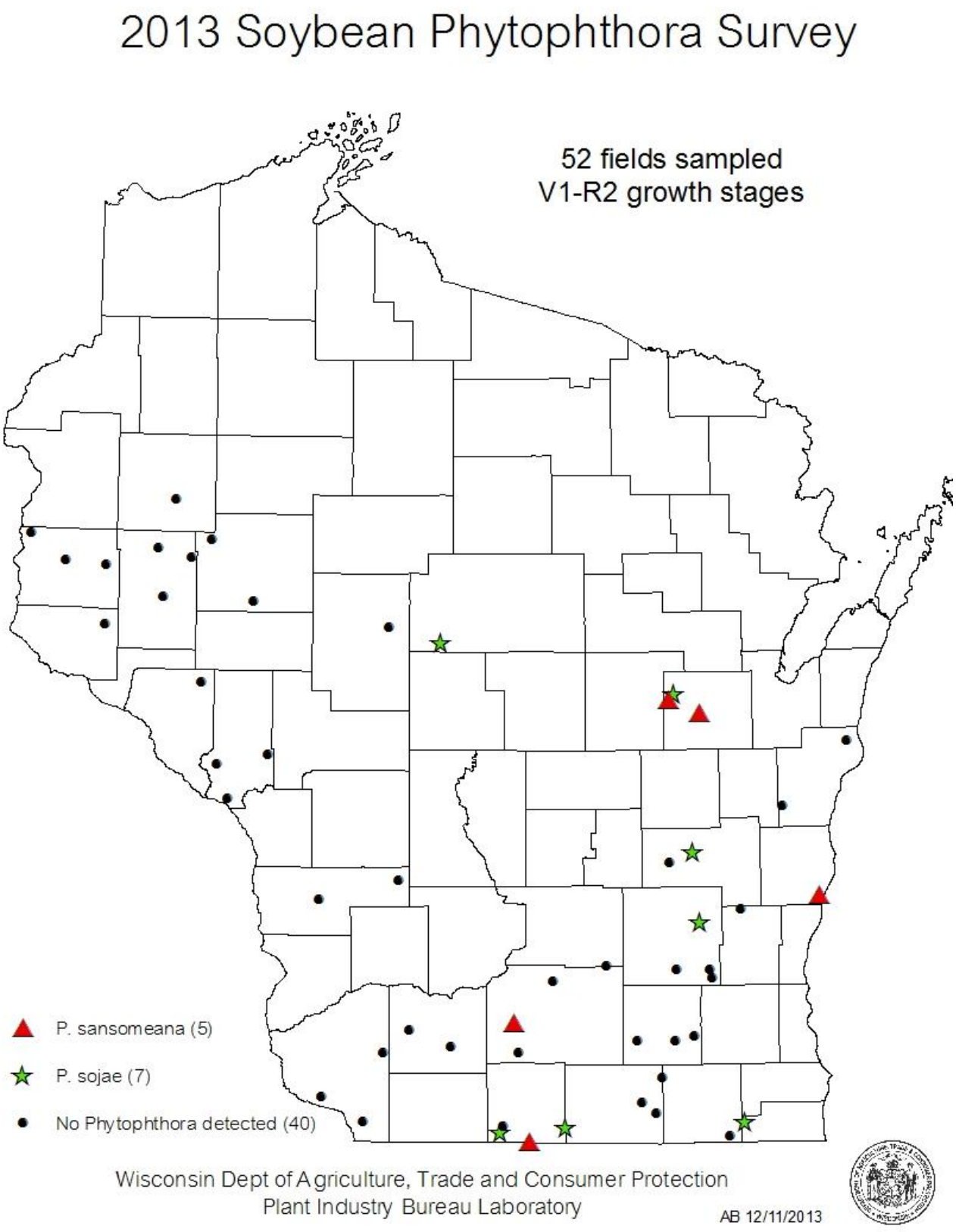
Outreach

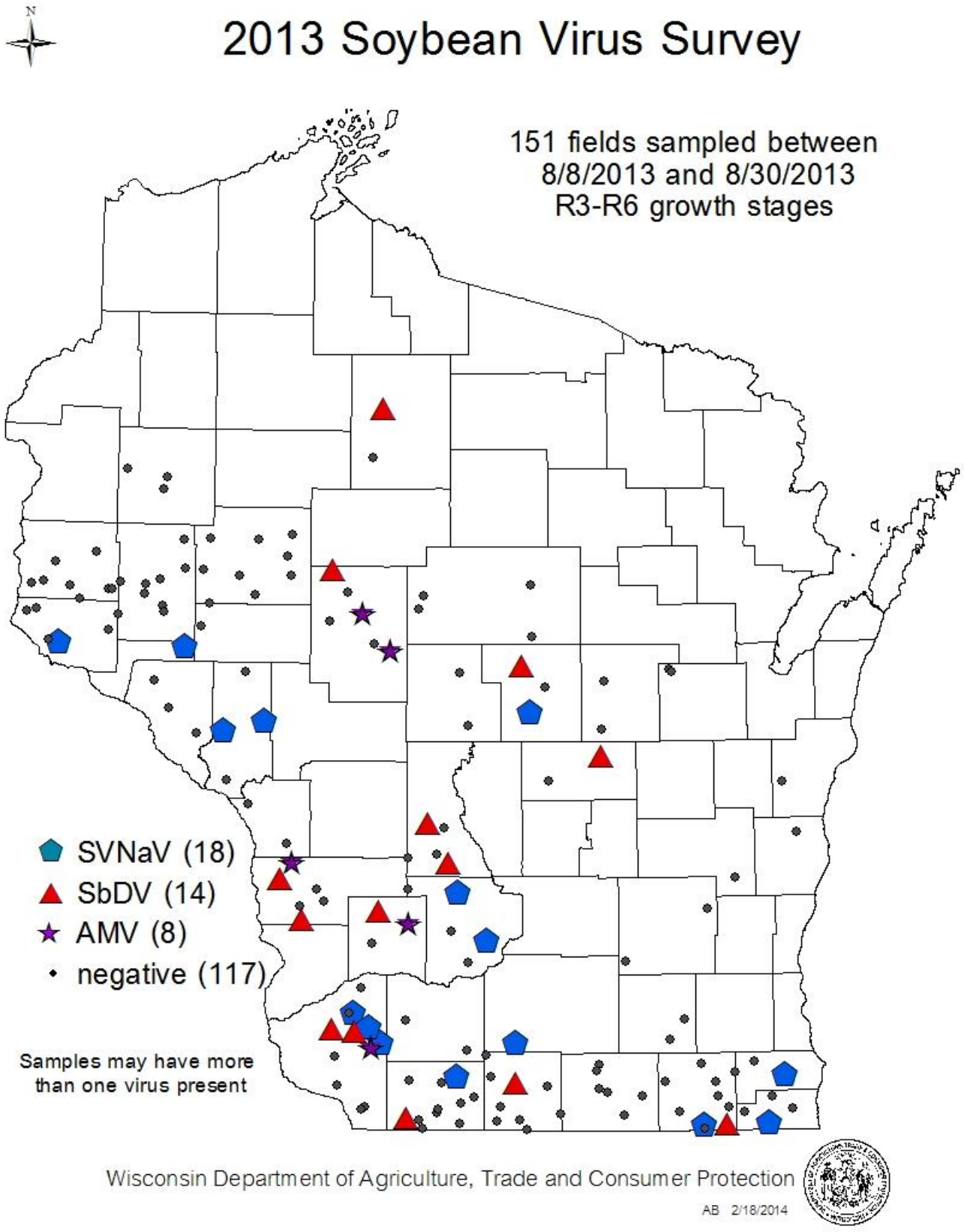
- Web site development is difficult at DATCP.
- Are there opportunities we are not seizing? Twitter? Facebook?
- We need to tie in with the First Detector program that Mark Renz at UW is developing with Farm Bill money.

Response and follow-up of pest reports

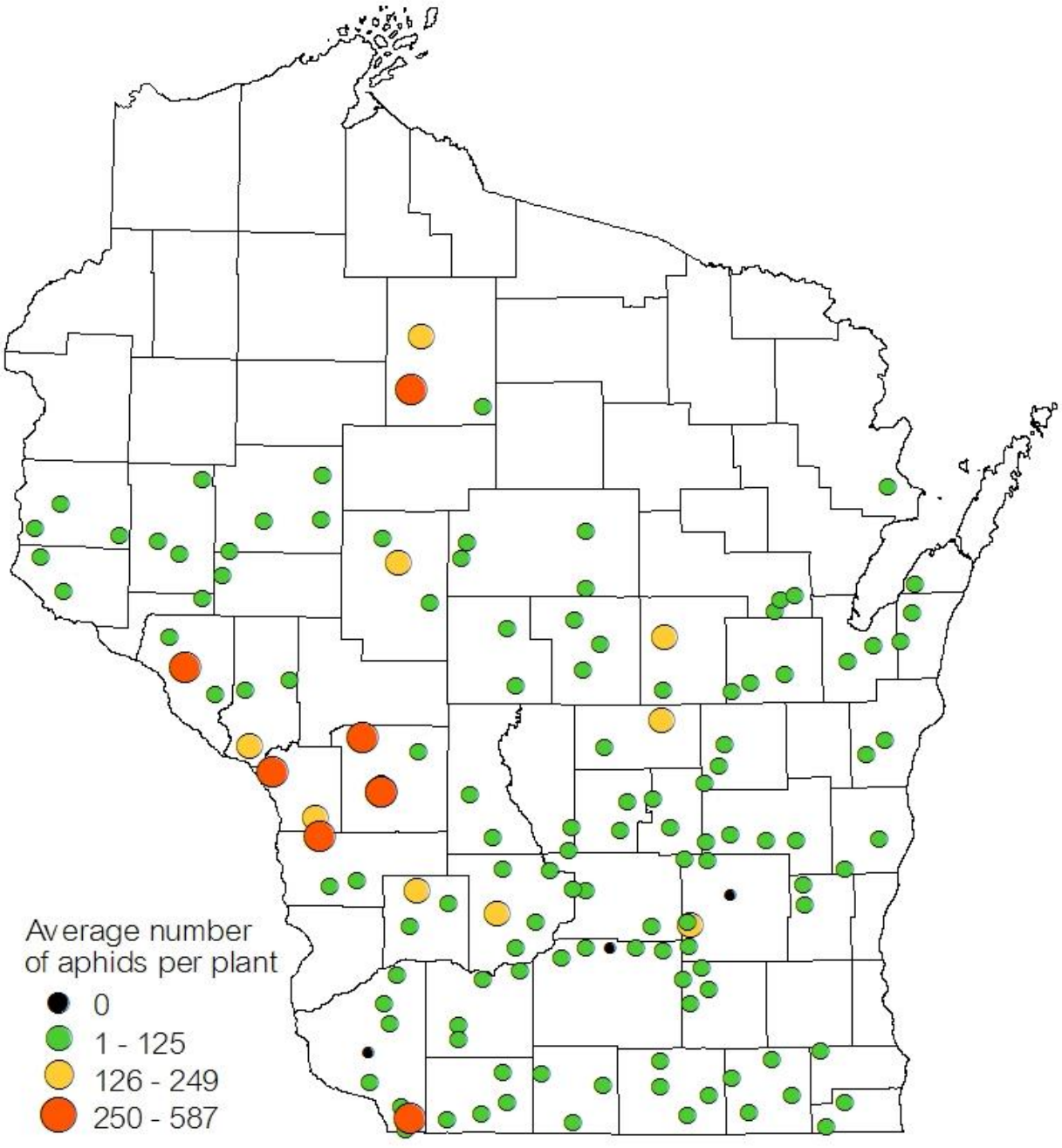
- Review of coordination of efforts to follow up on suspect pest finds. The Committee agrees that coordination has been good, and will continue to assure that it continues to function well.

Appendix C: Full Size Maps




2013 Soybean Virus Survey
151 fields sampled between
8/8/2013 and 8/30/2013
R3-R6 growth stages
SVNaV (18)
SbDV (14)
AMV (8)
negative (117)
Samples may have more
than one virus present
Wisconsin Department of Agriculture, Trade and Consumer Protection
AB 2/18/2014

Soybean Aphid Survey Results August 2013



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